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## ABSTRACT

The relationship between social studies preference and other subject matter preferences of elementary children over a two-year period is analyzed. A forced-choice test requiring students to rank order five basic subjects was administered to 75 pupils in randomly selected third-grade classes. Students represented the socioeconomic structure of an agricultural community in central California during 1971-72. Fifth-grade classes in the same schools were tested two years later. Extensive statistical analysis of results was performed, with the following conclusions: (1) children tend to value a subject equally well from primary to intermediate grades, with the exception of language; (2) children do not highly value social studies in relation to other subject matter; (3) social studies is better liked in grade 5 than in grade 3, but the difference seems insignificant; (4) when social studies is compared statistically with other subjects over a two-year period, children tend not to change their subject matter preferences; and (5) differences in subject matter preference appear to be more economically biased, with the disadvantaged student preferring social studies. Issues arising from the study include extent to which curriculum developers account for preference changes in preparation of material and whether preference changes result by chance, in response to new social studies programs, or as an outcome of teacher enthusiasm. (AV)

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THE RELATIONSHIP OF A GIVEN GROUP OF ELEMENTARY CHILDREN'S RANKINGS  
OF SOCIAL STUDIES WITH OTHER SUBJECT MATTER IN GRADES  
THREE AND FIVE\*

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In research comparing social studies with other basic subjects such as language, mathematics, reading, and science children and youth at all instructional levels overwhelmingly have held social studies in low or least esteem. When these comparisons were subjected to statistical treatment, social studies tended to be significantly disliked when age or grade levels were treated as a whole.

When the Ss were compared by sex or socio-economic areas different findings were evident. Commencing with grade four, boys tended to like social studies more than girls. No research below that grade has yielded definitive findings. Neither are definitive findings evident with regard to the relationship between socio-economic status and subject matter preference. Four studies indicated conflicting findings. Social studies was better liked by sixth and eleventh grade affluent area learners (Aven and Chrisp, 1971; Curry and Hughes, 1965) and by third and sixth grade disadvantaged area children (Rushdoony, 1975; Miles, 1957). Aven and Chrisp and Rushdoony found significant differences favoring their groups. Curry and Hughes and Miles based their conclusions on relative weightings.

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Only three longevity studies were found. In the thirties, Holmes (1937) conducted a questionnaire inventory for seven consecutive semesters with children in the intermediate grades. However, he was concerned with their cumulative overall weighting of their choices rather than comparing their choices from semester to semester or from year to year. During and after World War II, Jersild and Tasch (1949) conducted open-ended interest surveys with learners from grade one to twelve. They, too, treated both groups as one in reporting their findings. In 1957, Chase and Wilson (1958) replicated Chase's 1947 fifth grade study (1949) and found no significant difference in the ranking of social studies between the two groups.

Thus, it appears that no longevity study comparing the subject matter preferences of a particular group of Ss over a given period of time has been reported in the literature. To what extent a given group of youngsters will change preferences; in what subject matter those changes--if any-- will occur; and how the choices will compare with the accumulated data at a similar age level are inquiries needed to help resolve the status of social studies in comparison with other subjects. Social studies is already held in low esteem by the Ss in an overwhelming number of research studies. Will the Ss increasingly dislike a subject (Egan, 1973), particularly the social studies, as they progress in school? As the subject matter preferences of elementary children are important in curriculum decision making, the pursuit of this inquiry is in essence a primary reason for the present study.

Equally important is the need for additional data with regard to economic differences, wherein no definitive findings are evident. Likewise, the sample in this study will have undergone two additional years under the exegisis of the "new" social studies. Will the new social studies have any positive effect upon their choices? Or, has accountability with its accompanying emphasis upon reading and mathematics helped maintain these subjects in high esteem?

#### Purpose of the Study

In an attempt to assist in the continued resolution of these issues, the general purpose of this study was to analyze the relationship between social studies preference with other subject matter preferences of elementary children over a two-year period. Specifically, the study was divided into two parts involving, first, an analysis of the choices of the sample in grade five, and, secondly, a comparative analysis of choices of the sample in grades three and five. In each case, because of inconclusive research findings thus far, null hypotheses ~~were~~ tested at the .01 level.

For the first portion of the study, involving fifth graders only, it was hypothesized that:

1. There is no significant difference between fifth graders' social studies preference and other subject matter preferences.
2. There is no significant difference between affluent and disadvantaged area rank order ratings by fifth graders; and
3. There is no significant difference between affluent and disadvantaged area children's social studies preference and other subject mat-

ter preferences.

For the second portion of the study comparing the Ss choices in grades three and five, it was hypothesized that:

4. There is no significant difference between third and fifth graders' forced rank-order ratings.
5. There is no significant difference between third and fifth graders' social studies preference and other subject matter preferences.
6. There is no significant difference between third and fifth grade affluent and disadvantaged area children's rank-order ratings, and
7. There is no significant difference between third and fifth grade social studies preference and other subject matter preferences of affluent and disadvantaged area children.

#### The Design of the Study

A forced-choice test was prepared by the author in booklet form with an accompanying cassette tape to preclude any reading problems. The Ss were given simultaneous printed and oral directions to rank, in the order of their preference, the following subjects: language, mathematics, reading, science, and social studies. Accented in the booklet-tape test was a request that the rankings be in order of what the Ss liked best (1), second best (2) to that selected fifth (5).

The study was originally conducted in four randomly selected third grade classes in two schools representative of the socio-eco-

conomic structure of an agricultural community within Central California during 1971-72. Only data of the 75 Ss who completed both pre- and post-tests were utilized. The division of the sample by sex, economic area, and total sample appears in Table 1. Two years later, in June 1974, the identical test was re-administered in similar fashion to all six fifth grade classes in the same two schools. Only 51 Ss of the original 75 completed the test. The division of the sample by sex, economic area, and total sample appears in Table 2. During the experimental period, the Ss had been in 16 classrooms.

The economically affluent and disadvantaged areas were established by the county schools office, utilizing the criteria established by the local Office of Economic Opportunity. This means of determining economic areas was similar to that used by Aven and Chrisp (1971) and the distribution appears in Table 3.

Variables in the study were sex, socio-economic background, and the sample as a whole in grades 3 and 5. All data in the third grade post-test and fifth grade test were computed by chi-square tests of significance using  $2 \times 5$ ,  $4 \times 5$ , and  $8 \times 5$  contingency tables. Table 4 contains the mean rating related to hypotheses 1, 4, and 5. Table 5 contains the mean rating related to hypotheses 2, 3, 6, and 7.

## Findings

As indicated earlier, the problem was a longevity study involving the same Ss over a two-year period, June 1972 to June 1974, while the Ss advanced from grade three to five. The study was divided into two parts. The first, involving an analysis of choices while the sample was in grade five, is reported below under I.

### I

Hypothesis 1. There is no significant difference between fifth graders' social studies preference and other subject matter preferences.

An examination of Table 4 indicates the maintenance of reading and mathematics as the preferred subjects, though slippage in terms of reading for the boys is evident. Science and social studies moved up to third and fourth best liked, respectively. The boys preferred science above all subjects, while the girls liked social studies better than science. Language was liked least. None of the changes was significant with the exception of the preference between social studies and language (Table 6). However, the significant difference in terms of the criterion measure appeared only with the total sample, although a trend toward the null hypothesis criterion did appear with regard to the boys. Though the changes were quite dramatic in terms of increased liking for social studies and least liking of language (Table 4), the statistical results in Table 6 were inconclusive to ascertain with confidence whether or not

these differences were significant. Thus, judgment must be suspended as the hypothesis in this regard can neither be confidently rejected nor not rejected because of the seemingly inconclusive statistical results.<sup>1</sup>

The same assumption cannot be subscribed to with the comparative preference between social studies and mathematics wherein there is a tendency not to reject although the girls and total sample tend to approach the null hypothesis criterion level.

Thus, hypothesis one is essentially not rejected. However, judgment is withheld regarding the relationship between social studies and language.

Hypothesis 2. There is no significant difference between affluent and disadvantaged area rank-order ratings by fifth graders.

A comparison between fifth grade affluent and disadvantaged area Ss in Table 5 shows only slight variation between the groups. This is statistically verified in Table 7 wherein no significant differences were indicated.

Thus, the second hypothesis is not rejected.

Hypothesis 3. There is no significant difference between affluent and disadvantaged area children's social studies preference and other subject matter preferences.

As in hypothesis 2, a slight variation occurs between the economic groups' social studies and other subject matter preferences with one exception, boys' social studies and language preferences (Table 5).

As indicated in Table 8, no significant differences occurred



although the preference between boys' social studies and language tends to approach the criterion level of rejection.

Thus, the third hypothesis is not rejected.

## II

The second portion of the study involved a comparative analysis of the choices of the sample in grades three and five. The findings appear below.

Hypothesis 4. There is no significant difference between third and fifth graders' forced rank-order ratings.

An examination of Table 4 indicates the continued liking of reading and mathematics, though there tends to be a gain on the part of science and social studies at the expense of the other subjects. Only language seems to be losing appreciable ground from grade three to five. This latter finding is statistically significant (Table 9), though only with the total group in terms of the criterion measure. However, this tendency towards rejection of the hypothesis by both sexes necessitates a suspended judgment with regard to language as it cannot confidently be either rejected or not rejected.

With the exception of this suspended judgment regarding language, the fourth hypothesis is not rejected.

Hypothesis 5. There is no significant difference between third and fifth graders' social studies preference and other subject matter preferences.

With the exception of reading, the fifth hypothesis has mixed findings regarding the preference of social studies in relationship to other subjects (Table 10). The hypothesis seemingly may not be rejected between social studies and language in terms of both sexes but tends to approach the criterion measure with regard to the total group. Between social studies and mathematics the hypothesis may not be rejected only in terms of the boys, while it is rejected with regard to the girls and the total sample. Between social studies and science the hypothesis is rejected in terms of the total group, with a tendency towards rejection in terms of the sexes.

Thus, the hypothesis is rejected with regard to reading and judgment is withheld with regard to the other subjects even though there seemingly is a tendency to reject.

Hypothesis 6. There is no significant difference between third and fifth grade affluent and disadvantaged area children's rank-order ratings.

In comparing preference between economic area children's rank-order ratings, the findings are mixed in Table 11. The hypothesis is not rejected for mathematics, science, and reading, although the boys in the latter tend toward rejecting the hypothesis. The hypothesis is clearly rejected for social studies and language, with the exception of the girls in language.

Thus, the hypothesis is not rejected for mathematics, science, and reading, while it is rejected for social studies and language with the exception of the girls in language. In the latter case, judgment is suspended although the trend is towards rejection.

Hypothesis 7. There is no significant difference between third and fifth grade social studies preference and other subject matter preferences of affluent and disadvantaged area children.

An examination of Table 12 indicates that there is a significant difference between social studies and all other subjects with one exception. There is a tendency towards the criterion measure between the boys' social studies and mathematics preference.

Thus, hypothesis 7 is rejected with the exception of the boys' preference between social studies and mathematics wherein judgment was withheld.

#### Discussion

Discussion in this section is three-fold: on the total sample as fifth graders, economic area differentiation, and the two-year study.

The Total Sample as Fifth Graders. The non-statistical findings tend to support previous studies, but the statistical findings continue to leave some doubts (Rushdoony, 1975). Social studies is still held in low esteem. It was rated fourth in this study by the Ss in grade 5 (Table 4). Though it had surpassed language, the difference between the two was inconclusive statistically. In statistical terms, the differences in the rank-order ratings were not significant wherein the first hypothesis was not rejected. This finding tends to be contrary to previous research (Rochfort, 1959; Greenblatt, 1962; Rowland and Inskeep, 1963).

Economic Area Differentiation. The present study indicates that

economic area differentiation does not seemingly make a difference in rank-order or subject matter preference of social studies in grade 5 but that it does over a two-year period. Hypotheses 2 and 3, dealing with the sample as fifth graders, were not rejected. However, hypothesis 6, dealing with rank-order by economic area, was rejected for social studies and language. This is difficult to assess, though a reading of Table 5 seems to indicate that the significant difference may have been attributable to the increased liking of social studies and disliking of language by the affluent group. Hypothesis 7, dealing with preference between social studies and other subjects by economic groups, was likewise rejected. This, too, is difficult to assess. However, a perusal of Table 5 indicates that the differences were not necessarily all against social studies. The determination of which economic group the differences lie and their causes was not within the domain of this study. The findings in this section tend to concur with those of Miles (1957) and Rushdoony (1975).

Two-Year Study. The economic area differentiation of the two-year study was alluded to in the previous section. Results from the rank-order ratings and preference between social studies and other subjects yielded different results. In the former, the fourth hypothesis was not rejected. The Ss tended to be consistent in their preference of subjects. The major change was with language (wherein judgment was withheld) as it slipped to least liked. In the latter, the fifth hypothesis, the statistical data were inconclusive in all cases save reading. Thus, only in reading was the hypothesis re-

jected. The Ss still significantly preferred reading over social studies (Rushdoony, 1975). The finding, with the exception of the relationship between social studies and reading, is contrary to previous research (Rochfort, 1959; Greenblatt, 1962; Rowland and Inskip, 1963). The finding with regard to the significant difference between social studies and reading preference concurs with that of the original study (Rushdoony, 1975).

In non-statistical comparisons, the sample in grade 5 liked social studies increasingly better than in grade 3, ranking it fourth overall ahead of language. However, in the relative rankings, the girls--whether by economic area or as a whole--ranked social studies third. Boys and girls preferred social studies over language. The girls also like social studies better than or as much as science, while the disadvantaged area boys also like social studies better than mathematics. The boys and girls had similar liking for social studies. The differences were more between boys in economic areas, the disadvantaged area boys liking social studies better.

#### Summary and Conclusion

Although research in subject matter preferences of Ss has overwhelming found social studies in low or least esteem, limited longevity research has been conducted. Of the three longevity studies found none dealt with comparison of a sample over a period of time. Likewise, no definitive findings relative to subject matter preference by economic differentiation have accrued.

Thus, the general purpose of this study was to analyze the re-

lationship between social studies preference with other subject matter preferences of elementary children over a two-year period. In the first portion of the study dealing with the Ss as fifth graders, three null hypotheses were tested at the .01 level. Four additional null hypotheses were similarly tested in comparing the Ss' preferences while in grades three and five. The Ss' third grade selections were ascertained in the original study.

In the first part of the study, all three hypotheses were not rejected. No significant differences prevailed between social studies and other subjects. The differences between social studies and language, wherein judgment was withheld in hypothesis 1, favored social studies by all Ss. However, social studies was rated only above language. Likewise, parental economic status had no significant relationship in the Ss' rating of the subjects nor in terms of preference between social studies and other subjects.

In the second portion, the major thrust of the study, the findings were somewhat different when comparing the Ss' choices in grades 5 and 3.

The fourth and sixth hypotheses dealt with rank-order, first in terms of the total sample and then in terms of economic areas. Hypothesis 4 was not rejected with one exception. As in the case of the first part of the study, the exception dealt with language. Although the changes were the most dramatic, judgment was suspended as statistical results were inconclusive. On the other hand, hypothesis 6 was not rejected for mathematics, science, and reading in terms of rank-order by economic area. However, it was rejected

for social studies and language (suspended judgment of girls' language). In the case of the non-rejection there was indication that the variation in mean rating appears to be slight. With respect to social studies the significant difference is more difficult to ascertain, though it seems to lean towards the affluent group in both subjects.

Hypotheses 5 and 7 dealt with the preference between social studies and other subject matter by the total sample and by economic differentiation, respectively. In hypothesis 5, suspended judgment prevailed because of inconclusive statistical returns in all cases save reading. The hypothesis was rejected only between reading and social studies as it was in the original study. Hypothesis 7 was essentially rejected similar to the original study. Parental economic status seemingly did make a significant difference between selection of social studies and other subjects by the Ss. However, in this study the differences were not necessarily all against the social studies. Some appear to favor social studies.

To summarize, the sample tended to be consistent in its preference over a two-year period with social studies apparently still held at low esteem. However, social studies and science seemingly were gaining ground in terms of preference over the other subjects and had surpassed language. Statistically, the differences were not significant. Contrary to previous research, social studies was increasingly liked and seemingly equally liked by boys and girls. The differences were more between boys in economic areas, the disadvant-

aged boys liking social studies better.

The present study contributed to the accumulating research data regarding subject matter preferences of children. From the two-year study, the following four conclusions may be drawn:

1. Children tend to value a subject equally well from primary to the intermediate grades with one exception. They tend to dislike significantly language as they progress through school;
2. Although social studies is better liked in grade five than in grade three, the change seemingly is not a significant one. Children still do not highly value social studies in relationship to other subject matter;
3. When social studies is statistically compared with other subjects over a two-year period, children tend not to change their subject matter preferences. Their preference between social studies and other subject matter does not tend to differ significantly except for reading; and
4. Differences in pupil subject matter preference appear to be more economically biased.

The present study highlights the changing subject matter preferences of elementary children and the economic bias in the choices. A continuing question thus resounds: To what extent are curriculum decision makers accounting for these changes in the preparation of curriculum material? Concomitantly, to what extent are they preparing subject matter differently for differing economic groups?

The present study also highlights the need for continued research, short and long range, to determine whether the changes toward



children's increased liking of social studies as they progress through school is, in effect, a chance occurrence or due at least partially to the inception of the new social studies programs. The other findings need to be subjected to verification, as social studies is vitally important to the education of children in a modern society.

Research into why children like or dislike a subject, per se, and what aspects of a subject they favor or disfavor is equally important. Other variables such as children's self-image, impression of success, actual "grade" in a subject, achievement on a cognitive test, motivation in and for a subject, and the teacher's role in preference of a subject need to be explored. Subject matter preferences of teachers and any of the preceding variables with and without direct relationship to children's preferences need to be also examined.

Thus, the present study points towards some preliminary directions over a two-year period, but leaves many issues unresolved. These issues need to be pursued for the image children may have, or acquire, of the important place social studies has in their education may well be a vital step toward unlocking their future in modern society.

TABLE 1

Number of Pupils in Third Grade Study: By Sex, Economic Area, and  
Total Sample

	Affluent Area	Disadvantaged Area	Total Sample
Boys	22	17	39
Girls	19	17	36
Totals	41	34	75

TABLE 2

Number of Pupils in Fifth Grade: By Sex, Economic Area, and  
Total Sample<sup>a</sup>

	Affluent Area	Disadvantaged Area	Total Sample
Boys	13	9	22
Girls	16	13	29
Totals	29	22	51

<sup>a</sup>For purposes of Hypotheses 1-3.

TABLE 3

Number of Pupils in Study:<sup>a</sup> By Grade, Sex, Economic Area, and  
Total Sample

	Affluent Area		Disadvantaged Area		Total Sample	
	Grade		Grade		Grade	
	3	5	3	5	3	5
Boys	22	13	17	9	39	22
Girls	19	16	17	13	36	29
Totals	41	29	34	22	75	51

<sup>a</sup>For purposes of hypotheses 4-7.

TABLE 4

Mean Rating of Subject Matter by Total Sample at the End of Third  
and Fifth Grades

Subject	Grade Three			Grade Five		
	B	G	T	B	G	T
Language	3.28	2.86	3.08	4.40	3.75	4.03
Mathematics	2.89	2.66	2.78	2.59	2.51	2.54
Reading	2.17	1.97	2.08	2.68	2.41	2.52
Science	2.89	3.72	3.29	2.13	3.17	2.72
Social Studies	3.74	3.77	3.76	3.18	3.13	3.15

TABLE 5

## Mean Rating of Subject Matter by Economic Area

Subject	Affluent		Disadvantaged	
	Grade		Grade	
	3	5	3	5
Language				
Boys	2.68	4.30	4.05	4.55
Girls	2.21	4.06	3.58	3.38
Total	2.46	4.17	3.82	3.86
Mathematics				
Boys	2.86	2.07	2.94	3.77
Girls	2.78	2.18	2.52	2.92
Total	2.82	2.13	2.73	3.09
Reading				
Boys	1.86	2.92	2.58	2.33
Girls	1.78	2.56	2.17	2.23
Total	1.82	2.72	2.38	2.27
Science				
Boys	3.09	2.15	2.64	2.11
Girls	3.52	3.12	3.94	3.23
Total	3.29	2.68	3.29	2.77
Social Studies				
Boys	4.50	3.53	2.76	2.66
Girls	4.68	3.06	2.76	3.23
Total	4.58	3.27	2.76	3.00

TABLE 6

Chi-square Tests of Significance Between Social Studies Preference  
and Other Subject Preferences of Fifth Grade Sample

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	11.359*	5.876	13.978**
Mathematics	3.897	10.514*	10.887*
Reading	2.838	4.291	6.569
Science	6.798	7.614	5.858

<sup>a</sup>df = 4

\*  $p < .05$

\*\*  $p < .01$

TABLE 7

Chi-square Tests of Significance Between Fifth Grade Affluent and  
Disadvantaged Area Children's Rank-Order Ratings

Subject	Boys		Girls		Total	
	df	$\chi^2$	df	$\chi^2$	df	$\chi^2$
Language	2	0.922	3	3.527	3	3.699
Mathematics	4	7.472	4	5.055	4	7.440
Reading	4	6.438	4	7.571	4	4.294
Science	4	3.212	4	7.773	4	7.121
Social Studies	4	8.762	4	2.054	4	1.904



TABLE 8

Chi-square Tests of Significance Between Social Studies Preference  
and Other Subject Preferences of Fifth Grade Affluent and Disadvan-  
taged Area Children

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	25.508*	11.757	19.079
Mathematics	16.550	16.795	19.318
Reading	16.895	14.962	13.024
Science	18.752	16.016	13.752

<sup>a</sup>df = 12

\*  $p < .02$

TABLE 9

Chi-square Tests of Significance Between Third and Fifth Grade  
Rank-Order Ratings of Total Sample

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	12.497**	9.584*	17.081***
Mathematics	1.418	7.555	4.399
Reading	6.826	3.248	8.742
Science	6.756	10.638	8.772
Social Studies	3.616	8.351	7.793

<sup>a</sup>df = 4

\*  $p < .05$

\*\*  $p < .02$

\*\*\*  $p < .01$

TABLE 10

Chi-square Tests of Significance Between Third and Fifth Grade  
Social Studies Preference and Other Subject Preferences of Total  
Sample

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	18.867	20.717	25.527**
Mathematics	16.004	31.768***	38.044****
Reading	34.571****	43.141****	65.597****
Science	25.951**	22.818*	27.413***

<sup>a</sup>df = 12

\*  $p < .05$

\*\*  $p < .02$

\*\*\*  $p < .01$

\*\*\*\*  $p < .001$

TABLE 11

Chi-square Tests of Significance Between Third and Fifth Grade  
Affluent and Disadvantaged Area Children's Rank-Order Ratings

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	27.329**	25.079*	43.042***
Mathematics	9.721	16.522	16.741
Reading	25.179*	14.500	20.490
Science	14.183	19.682	18.960
Social Studies	29.944**	36.708***	49.725***

<sup>a</sup>df = 12

\*  $p < .02$

\*\*  $p < .01$

\*\*\*  $p < .001$

TABLE 12

Chi-square Tests of Significance Between Third and Fifth Grade  
Social Studies Preference and Other Subject Preferences of Affluent  
and Disadvantaged Area Children

Subject	Boys <sup>a</sup>	Girls <sup>a</sup>	Total <sup>a</sup>
Language	61.163**	65.236**	92.764**
Mathematics	47.038*	71.291**	93.425**
Reading	76.634**	90.884**	126.842**
Science	59.237**	61.409**	82.057**

<sup>a</sup>df = 28

\*  $p < .02$

\*\*  $p < .001$

FOOTNOTE

<sup>1</sup>For a rationale regarding the author's reserving judgment with regard to hypothesis testing, see McNemar (1962, pp. 63-69).

# REFERENCES

Aven, S.D., and Chrisp, Marvin, "Subject Preferences in Deprived and Affluent Areas," Improving College and University Teaching, 19 (Autumn, 1971), 333-34.

Chase, W. Linwood, "Subject Preferences of Fifth-Grade Children," Elementary School Journal, 50 (December, 1949), 204-11.

Chase, W. Linwood, and Wilson, Gilbert M., "Preference Studies in Elementary School Social Studies," Journal of Education, 140 (April, 1958), 2-28.

Curry, Robert L., and Hughes, Hughie, "Subject Areas Preferred by High School Juniors," Peabody Journal of Education, 42 (January, 1965), 236-40.

Egan, A.L., "Incidental Learning: A Study of Attitudes," Education, 93 (April-May, 1973), 314-21.

Greenblatt, E.L., "An Analysis of School Subject Preferences of Elementary School Children of the Middle Grades," The Journal of Educational Research, 55 (August, 1962), 554-60.

Holmes, Ethel E., "School Subjects Preferred by Children," in Appraising the Elementary School Program, 16th Yearbook of the National Elementary Principal (Washington, D.C.: National Education Association, 1937).

Jersild, Arthur T., and Tasch, Ruth J., Children's Interest and What They Suggest for Education, (New York: Bureau of Publications, Teachers College, Columbia University, 1949).

McNemar, Quinn, Psychological Statistics, 3rd ed. (New York: John Wiley and Sons, Inc., 1962).

Miles, Logan Troy, "Children's Preferences for School and Out-of-School Activities," Unpublished Ed.D. Dissertation, University of California, 1957.

Rochfort, George B. Jr., "Evaluating Social-Personal Outcomes in Differentiated Instruction," Journal of Education, 142 (December, 1959), 66-71.

Rowland, Monroe, and Inskip, James, "Subject Preferences of Upper Elementary School Children in Cajon Valley Union School District," California Journal of Educational Research, 14 (September, 1963), 187-91.

Rushdoony, Haig A., "How Primary Children Rank Social Studies in Relationship to Other Subjects," Unpublished paper, California State College, Stanislaus, Turlock, California, 1975.